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Report a Publication

2017

1. Avery, A.S., & Jacob, J.D. (2017). Evaluation of low altitude icing conditions for small unmanned aircraft. *9th AIAA Atmospheric and Space Environments Conference, AIAA Aviation Forum*, (AIAA 2017-3929). DOI: [10.2514/6.2017-3929](#)
2. Ayalew, S., Confer, A.W., Hansen, R.D., & Couger, M.B. (2017). Genome sequence of Mannheimia haemolytica Serotype 1 Strain 16041065 BH. *Genome Announcements*, 5(14). DOI: [10.1128/genomeA.01721-16](#)
3. Ayalew, S., Confer, A.W., Hansen, R.D., & Couger, M.B. (2017). Genome sequence of a spontaneous nonhemolytic mutant of Mannheimia haemolytica 16041065 GH. *Genome Announcements*, 5(14). DOI: [10.1128/genomeA.01720-16](#)
4. Babu, K.S., Bajc, B., & Saad, S. (2017). Yukawa sector of minimal SO(10) unification. *Journal of High Energy Physics*. (available online 28 Feb 2017). DOI: [10.1007/JHEP02\(2017\)136](#)
5. Babu, K.S., Khanov, A., & Saad, S. (2017). Anarchy with hierarchy: A probabilistic appraisal. *Physical Review D*, 95(1). DOI: [10.1103/PhysRevD.95.055014](#)
6. Cao X., Gulati M., & Jiang H. (2017). Serine protease-related proteins in the malaria mosquito, Anopheles gambiae. *Insect Biochemistry and Molecular Biology*, 88(September), 48-62. DOI: [10.1016/j.ibmb.2017.07.008](#)
7. Cho, J., Grogg, K., Min, C.H., Zhu, X., Paganetti, H., Lee, H.C., & El-Fakhri, G. (2017). Feasibility study of using fall-off gradients of early and late PET scans for proton range verification. *Med. Phys.*, 44.
8. Chuba, D., Goyder, D., Chase, M.W., & Fishbein, M. (2017). Phylogenetics of the African *Asclepias* complex (Apocynaceae) based on three plastic DNA regions. *Systematic Botany*, 42(1), 148-159. DOI: [10.1600/036364417X694539](#)
9. Farag, I.F., Youssef, N.H., & Elshahed, M.S. (2017). Global distribution patterns and pangenomic diversity of the candidate phylum "Latescibacteria" (WS3). *Applied and Environmental Microbiology*, (available online 17 March 2017). DOI: [10.1128/AEM.00521-17](#)
10. Harris, A.J., Dee, J., & Palmer, M.W. (2017). The effects of taxonomic rank on climatic calibrations: A test using extant floras of United States counties. *Review of Palaeobotany and Palynology*, (available online 8 Feb 2017). DOI: [10.1016/j.revpalbo.2017.02.002](#)
11. Hendershot, M.E., & Liang, Y. (2017). Estimating judicial accomplishment: Applying the legislative accomplishment strategy to the decisions of the Supreme Court. *Justice System Journal*, 1-21 (online 22 Mar 2017). DOI: [10.1080/0098261X.2017.1296386](#)
12. Kibble, G.A., Jacob, J.D., Alexander, A., Elbing, B.R., Ireland, P., & Black, B. (2017). Aerodynamic investigation of the conformal vortex generator, *47th AIAA Fluid Dynamics Conference, AIAA AVIATION Forum*, (AIAA 2017-3117). DOI: [10.2514/6.2017-3177](#)

13. Moktan, H., & Zhou, D.H. (2017). Wing 1 of protein HOP2 is as important as helix 3 in DNA binding by MD simulation. *Journal of Biomolecular Structure and Dynamics*, 1-14, (online 08 Jun 2017). DOI: [10.1080/07391102.2017.1333458](https://doi.org/10.1080/07391102.2017.1333458)
 14. Passow, C.N., Brown, A.P., Arias-Rodriguez, L., Yee, M.C., Sockell, A., Scharl, M., Warren, W.C., Bustamante, C., Kelley, J.L., & Tobler, M. (2017). Complexities of gene expression patterns in natural populations of an extremophile fish (*Poecilia mexicana*, Poeciliidae). *Molecular Ecology*, (online 9 June 2017). DOI: [10.1111/mec.14198](https://doi.org/10.1111/mec.14198)
 15. Pleinert, M.O., Von Zanthier, J., & Agarwal, G.S. (2017). Hyperradiance-a new paradigm in 60 years of superradiance. arXiv: [1702.05392](https://arxiv.org/abs/1702.05392)
 16. Shah, J.K., Marin-Rimoldi, E., Mullen, R.G., Keene, B.P., Khan, S., Paluch, A.S., et. al. (2017). Cassandra: An open source Monte Carlo package for molecular simulation. *Journal of Computational Chemistry*, (online 24 April 2017). DOI: [10.1002/jcc.24897](https://doi.org/10.1002/jcc.24897)
 17. Feng X., Castro M.C., Linde E., & Papes M. (2017). Armadillo Mapper: A Case Study of an Online Application to Update Estimates of Species' Potential Distributions. *Tropical Conservation Science*, 10. DOI: 10.1177/1940082917724133.
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2016

1. Alderman, P.D., & Stanfill, B. (2016). Quantifying model-structure- and parameter-driven uncertainties in spring wheat phenology prediction with Bayesian analysis. *European Journal of Agronomy*, (online 6 October 2016). DOI: [10.1016/j.eja.2016.09.016](https://doi.org/10.1016/j.eja.2016.09.016)
2. Andreason, S.*, Schnieder, W., & Wayadande, A. (2016). Detection of plant pathogens within insect vector transcriptome sequencing datasets. Proceedings of: Entomological Society of America Southwestern Branch Meeting: Tyler, TX.
3. Babu, K.S., Bajc, B., & Saad, S. (2016). New class of SO(10) models for flavor. *American Physical Society*, (online 25 July 2016). DOI: [10.1103/PhysRevD.94.015030](https://doi.org/10.1103/PhysRevD.94.015030). arXiv: [1605.05116v1](https://arxiv.org/abs/1605.05116v1)
4. Blagden, T., Schneider, W., Melcher, U., Daniels, J.*, & Fletcher, J. (2016). Adaptation and validation of E-probe diagnostic nucleic acid analysis for detection of *Escherichia coli* O157:H7 in metagenomic data from complex food matrices. *Journal of Food Protection*, 79(4), 574-581. DOI: [10.4315/0362-028X.JFP-15-440](https://doi.org/10.4315/0362-028X.JFP-15-440)
5. Brini, E. Paranehewage, S.S., Fennell, C.J., & Dill, K.A. (2016). Adapting the semi-explicit assembly solvation model for estimating water-cyclohexane partitioning with the SAMPL5 molecules. *J. Comput. Aided Mol. Des.* DOI: [10.1007/s10822-016-9961-9](https://doi.org/10.1007/s10822-016-9961-9).
6. Buchanan, J.W., Reecy, J.M., Garrick, D.J., Duan, Q., Beitz, D.C.,...Mateescu, R.G. (2016). Deriving gene networks from SNP associated with Triacylglycerol and Phospholipid fatty acid fractions from ribeyes of Angus cattle. *Frontiers in Genetics*, 7(116), 1-12. DOI: [10.3389/fgene.2016.00116](https://doi.org/10.3389/fgene.2016.00116).
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11. Couger, M.B., Wright, A., Lutter, E.I., & Youssef, N. (2016). Draft genome sequences of five *Pseudomonas aeruginosa* clinical strains isolated from Sputum samples from Cystic Fibrosis patients. *Genome announcements*, 4(1), e01528-15. DOI: [10.1128/genomeA.01528-15](https://doi.org/10.1128/genomeA.01528-15)
12. Das, S. & Mykles, D.L. (2016). A comparison of resources for the annotation of a De Novo assembled transcriptome in the molting gland (Y-organ) of the Blackback Land Crab. *Integrative and Comparative Biology*, (online 22 Aug 2016). DOI: [10.1093/icb/icw107](https://doi.org/10.1093/icb/icw107)
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16. Frahm, K.A., Pepper, M.E., Zhang, J.Y., Luthra, S., Chakka, A.B., Couger, M.B., Chandran, U.R., Monaghan, A.P., & DeFranco, D.B. (2016). Research Resource: The Dexamethasone Transcriptome in Hypothalamic Embryonic Neural Stem Cells. *Biotechnol. Biofuels*, 30(1), 144-154. DOI: [10.1210/me.2015-1258](https://doi.org/10.1210/me.2015-1258)
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22. Maulik, R.*, & San, O.* (2016). A stable and scale-aware dynamic modeling framework for subgrid-scale parameterizations of two-dimensional turbulence. *Computers & Fluids*, (online 27 November 2016). DOI: [10.1016/j.compfluid.2016.11.015](https://doi.org/10.1016/j.compfluid.2016.11.015)
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27. Pajouh, F.M., Balasundaram, B., & Hicks, I.V. (2016). On the 2-club polytope of graphs. *Operations Research*, (online 17 June 2016). DOI: [10.1287/opre.2016.1500](https://doi.org/10.1287/opre.2016.1500)
28. Pajouh, F.M., Moradi, E. *, & Balasundaram, B. (2016). Detecting large risk-averse 2-clubs in graphs with random edge failures. *Annals of Operations Research*, (online 03 Aug 2016). DOI: [10.1007/s10479-016-2279-0](https://doi.org/10.1007/s10479-016-2279-0)
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31. Pourhabib, A.* (2016). Empirical similarity for absent data generation in imbalanced classification. (online 12 May 2016). arXiv: [1508.01235v2](https://arxiv.org/abs/1508.01235v2)
32. Schneider, W.D., Goncalves, T.A., Uchima, C.A., Couger, M.B., Prade, R., Squina, F.M.,...Camassola, M. (2016). *Penicillium echinulatum* secretome analysis reveals the fungi potential for degradation of lignocellulosic biomass. *Biotechnol. Biofuels*, 9(66). DOI: [10.1186/s13068-016-0476-3](https://doi.org/10.1186/s13068-016-0476-3)
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Dissertations & theses

1. Andreason, Sharon. (2016). Discrimination and transcriptional response analysis of hemipteran phytopathogens [dissertation]. [Stillwater, OK]: Department of Entomology & Plant Pathology, Oklahoma State University. Advisor: Astri Wayadande.
2. Miao, Z. (2016 May). Combinatorial and global optimization approaches to the maximum quasi-clique [dissertation]. [Stillwater, OK]: Department of Industrial Engineering & Management, Oklahoma State University. Advisor: Baski Balasundaram.
3. Mohanty, R.P. (2016). Pollen biology and landscape ecology of *Juniperus*: An integrative study using quantitative molecular approaches, ultrastructure and habitat modeling [dissertation]. [Tulsa, OK]: Department of Biology, University of Tulsa. Advisor(s): Estelle Levetin & Mark Buccheim.

4. Moradi, E. (2016 May). Decomposition algorithms for detecting low-diameter clusters in graphs [dissertation]. [Stillwater, OK]: Department of Industrial Engineering & Management, Oklahoma State University. Advisor: Baski Balasundaram.
 5. Mortazavian, H. (2016 May). Polymer adsorption on silica and wettability of graphene oxide surfaces, experiments and simulations [dissertation]. [Stillwater, OK]: Department of Chemistry, Oklahoma State University. Advisor: Frank Blum.
 6. Li, X. (2016 May). Microbial communities in soil ecosystems under different land uses [dissertation]. [Stillwater, OK]: Department of Plant & Soil Sciences, Oklahoma State University. Advisor: Shiping Deng.
 7. Sun, L. (2016 May). Modeling the Oklahoma Mesonet data with a multivariate spatial Dirichlet process mixture [master's thesis]. [Stillwater, OK]: Department of Statistics, Oklahoma State University. Advisor: Ye Liang.
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2015

1. Al-Rubaye, A.A., Couger, M.B., Ojha, S., Pummill, J.F., Koon II, J.A., Wideman Jr., R.F., & Rhoads, D.D. (2015). Genome analysis of *Staphylococcus agnetis*, an agent of lameness in broiler chickens. *PLoS One*, 10(11), e0143336. DOI: [10.1371/journal.pone.0143336](https://doi.org/10.1371/journal.pone.0143336)
2. Andreason, S.*, Schneider, W., Davis, R., & Wayadande, A. (2015). E-probe diagnostic nucleic acid assay (EDNA) detection of *Spiroplasma kunkelli* in gray lawn leafhopper, *Exitianus exitiosus*, (Uhl.), transcriptome sequencing dataset. Proceedings of: Entomological Society of America National Meeting: Minneapolis, MN.
3. Balasundaram, B. (2015, September 11). Cliques & Clubs. Presented at: Seminar Series, Department of Industrial & Systems Engineering, Texas A&M University: College Station, TX.
4. Balasundaram, B. (2015, July 12-17). On the 2-club polytope of graphs. Presented at: 22nd International Symposium on Mathematical Programming: Proceedings of the 22nd International Symposium on Mathematical Programming: Pittsburgh, PA.
5. Buchanan, J.W., Koltes, J.E., Reecy, J.M., & Mateescu, R.G. (2015, Jan. 12.) Deriving gene networks involving tenderness and sensory attributes in steaks from Angus beef cattle. Presented at: PAG XXIII. Proceedings of the 23rd International Plant and Animal Genome Conference: San Diego, CA.
6. Cao, X., He, Y., Hu, Y., Wang, Y., Chen, Y., Bryant, B., Clem, R., Schwartz, L., Blissard, G., & Jiang, H. (2015). The immune signaling pathways of *Manduca sexta*. *Insect Biochemistry and Molecular Biology*, 62, 64-74. (online 7 April 2015). DOI: [10.1016/j.ibmb.2015.03.006](https://doi.org/10.1016/j.ibmb.2015.03.006)
7. Cao, X., & Jiang, H. (2015). Integrated modeling of protein-coding genes in *Manduca sexta* genome using RNA-Seq data from the biochemical model insect, *Insect Biochemistry and Molecular Biology*, 62, 2-10. (online 20 January 2015). DOI: [10.1016/j.ibmb.2015.01.007](https://doi.org/10.1016/j.ibmb.2015.01.007)
8. Couger, M.B., Hanafy, R.A., Edens, C., Budd, C., French, D.P., Hoff, W.D., Elshahed, M.S., & Youssef, N.H. (2015). Draft genome of the *Arthrobacter* sp. Strain Edens01. *Genome announc.*, 3(6), pii: e01475-15. DOI: [10.1128/genomeA.01475-15](https://doi.org/10.1128/genomeA.01475-15)
9. Couger, M.B., Hurlbut, A., Edens, C., Budd, C., French, D.P., Hoff, W.D., Elshahed, M.S., & Youssef, N.H. (2015). Draft genome sequence of the environmental isolate *Chryseobacterium* sp. Hurlbut01. *Genome announc.*, 3(5), pii: e01071-15. DOI: [10.1128/genomeA.01071-15](https://doi.org/10.1128/genomeA.01071-15)

10. Couger, M.B., Hanafy, R.A., Mitacek, R.M., Budd, C., French, D.P., Hoff, W.D., Elshahed, M.S., & Youssef, N.H. (2015). The draft genome sequence of *Xanthomonas* sp. Strain Mitacek01 expands the pangenome of a genus of plant pathogens. *Genome announc.*, 3(6), pii: e01450-15. DOI: [10.1128/genomeA.01450-15](https://doi.org/10.1128/genomeA.01450-15)
11. Couger, M.B., Youssef, N.H., Struchtemeyer, C.G., Ligenstoffer, A.S., & Elshahed, M.S. (2015). Transcriptomic analysis of lignocellulosic biomass degradation by the anaerobic fungal isolate *Orpinomyces* sp. strain C1A. *Biotechnol. Biofuels*, 8, 208. DOI: [10.1186/s13068-015-0390-0](https://doi.org/10.1186/s13068-015-0390-0)
12. Dutta, M.*, Ali, A., & Melcher, U. (2015). Detection, discrimination and discovery of a new Tobacco streak virus strain. *J. Virol. Method*, 221, 15-21. DOI: [10.1016/j.jviromet.2014.03.025](https://doi.org/10.1016/j.jviromet.2014.03.025)
13. Espindola, A.*, Schneider, W., Hoyt, P. R., Marek, S. M., & Garzon, C. (2015). A new approach for detecting fungal and oomycete plant pathogens in next generation sequencing metagenome data utilising electronic probes. *International Journal of Data Mining and Bioinformatics*, 12 (2), 115-128. DOI: [10.1504/IJDMB.2015.069422](https://doi.org/10.1504/IJDMB.2015.069422) PMID: 26510298
14. Farmanesh, B., & Pourhabib, A.* (2015). Sparse pseudo-input local kriging for large non-stationary spatial datasets with exogenous variables. (online 5 August 2015). arXiv: [1508.01248v1](https://arxiv.org/abs/1508.01248v1)
15. He, Y., Cao, X., Li, K., Hu, Y., Chen, Y., Blissard, G., Kanost, M., & Jiang, H. (2015). A genome-wide analysis of antimicrobial effector genes and their transcription patterns in *Manduca sexta*. *Insect Biochemistry and Molecular Biology*, 62, 23-37. (online 3 February 2015). DOI: [10.1016/j.ibmb.2015.01.015](https://doi.org/10.1016/j.ibmb.2015.01.015)
16. Heisterkamp, D.R. (2015, December 9-11.) Lambda-Consensus Clustering. Presented at: ICMLA 2015. Proceedings of the 14th IEEE International Conference on Machine Learning and Applications; Miami, FL.
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18. Matyi, S.A., Hoyt, P.R., Ayoubi-Canaan, P., Hasan, N.A., & Gustafson, J.E. (2015). Draft genome sequence of strain ATCC 33958, reported to be *Elizabethkingia miricola*. *Genome Announcements*, 3 (4), e00828-15. DOI: [10.1128/genomeA.00828-15](https://doi.org/10.1128/genomeA.00828-15)
19. Miao, Z. (2015, November 1-4). On the Lagrangian dual of the maximum quas clique problem. Presented at: 2015 INFORMS Annual Meeting: Philadelphia, PA.
20. Moradi, E.*, and Balasundaram, B. (2015). Finding a maximum k-club using the k-clique formulation and canonical hypercube cuts. *Optimization Letters*, 1-11. (online 14 November 2015). DOI: [10.1007/s11590-015-0971-7](https://doi.org/10.1007/s11590-015-0971-7)
21. Mortazavaian, H., Fennel, C., & Blum, F. (2015). Structure of the interfacial region in adsorbed poly(vinyl acetate) on silica. *Macromolecules*, (online 31 December 2015). DOI: [10.1021/acs.macromol.5b02214](https://doi.org/10.1021/acs.macromol.5b02214)
22. Neeman, H., Adams, K., Alexander, J., Brunson, D., Calhous, S.P., Deaton, J., Fotou, F.F., Frinkle, K., Gray, Z., Lemley, E., Louthan, G., Monaco, G., Morris, M., Snow, J., & Zimmermann, B. (2015). On fostering a culture of research cyberinfrastructure grant proposals within a community of service providers in an EPSCoR state. Presented at: XSEDE '15. Proceedings of the 2015 XSEDE Conference: Scientific Advancements Enabled by Enhanced Cyberinfrastructure. Article No. 19, ACM New York, NY. table of contents ISBN: 978-1-4503-3720-5 doi:[10.1145/2792745.2792764](https://doi.org/10.1145/2792745.2792764)
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2. Cavener, M. (2015, July). Vibrational Structural Markers for Infrared Structural Biology of Arginine in Proteins [senior thesis]. [Stillwater (OK)]: Department of Physics, Oklahoma State University. Advisor: Aihua Xie.
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Dissertations, theses & posters

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2. Chen, S. (2013). Nonparametric ANOVA using kernel methods [dissertation]. [Stillwater, OK]: Department of Statistics, Oklahoma State University. Advisor: Ibrahim Ahmad.
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